



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

16

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/699,282	10/31/2003	Robert C. Ucman	057069-008	2557
27805	7590	02/22/2005	EXAMINER	
THOMPSON HINE L.L.P. 2000 COURTHOUSE PLAZA, N.E. 10 WEST SECOND STREET DAYTON, OH 45402			JACYNA, J CASIMER	
			ART UNIT	PAPER NUMBER
			3751	

DATE MAILED: 02/22/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/699,282	UCMAN, ROBERT C.	
	Examiner	Art Unit	
	J. Casimer Jacyna	3751	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1) Responsive to communication(s) filed on 31 October 2003.

2a) This action is **FINAL**. 2b) This action is non-final.

3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4) Claim(s) 1-31 is/are pending in the application.

4a) Of the above claim(s) 20-26 is/are withdrawn from consideration.

5) Claim(s) 27-31 is/are allowed.

6) Claim(s) 1,2,4-6,10-15,18 and 19 is/are rejected.

7) Claim(s) 3,7-9,16 and 17 is/are objected to.

8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9) The specification is objected to by the Examiner.

10) The drawing(s) filed on _____ is/are: a) accepted or b) objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a) All b) Some * c) None of:

1. Certified copies of the priority documents have been received.

2. Certified copies of the priority documents have been received in Application No. _____.

3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) Notice of References Cited (PTO-892)

2) Notice of Draftsperson's Patent Drawing Review (PTO-948)

3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____.

4) Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.

5) Notice of Informal Patent Application (PTO-152)

6) Other: _____.

1. Restriction to one of the following inventions is required under 35 U.S.C. 121:
 - I. Claims 1-19 and 27-31, drawn to a valve spring retainer, classified in class 251, subclass 337.
 - II. Claims 20-26, drawn to a method of manufacturing a valve spring retainer, classified in class 29, subclass 890.12.

The inventions are distinct, each from the other because of the following reasons:

2. Inventions II and I are related as process of making and product made. The inventions are distinct if either or both of the following can be shown: (1) that the process as claimed can be used to make other and materially different product or (2) that the product as claimed can be made by another and materially different process (MPEP § 806.05(f)). In the instant case the product as claimed can be made by another and materially different process such as applying the tungsten carbide coating by dry plating or gas nitriding or vapor deposition as discussed on col. 1, lines 28-36 of the Hirai reference, or thermally sprayed as disclosed in Quets, and not using the HVOF process called for in step (c) of claim 20, nor the roughening step (b).
3. Because these inventions are distinct for the reasons given above and have acquired a separate status in the art because of their recognized divergent subject matter, restriction for examination purposes as indicated is proper.
4. During a telephone conversation with Mr. Michael J. Nieberding on 2/16/2005 a provisional election was made with traverse to prosecute the invention of apparatus group I, claims 1-19 and 27-31. Affirmation of this election must be made by applicant

in replying to this Office action. Claims 20-26 are withdrawn from further consideration by the examiner, 37 CFR 1.142(b), as being drawn to a non-elected invention.

5. The disclosure is objected to because of the following informalities: There is no description of figure 6 in the Brief Description of the Drawings on page 2.

Appropriate correction is required.

6. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

7. Claims 10 and 11 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. Claim 10 depends from only the spring seat of the valve retainer of claim 1 which spring seat is only a portion of the combination of elements in claim 1. Since claim 10 is dependent from only a portion of claim 1, it is not certain exactly how much of the subject matter of claim 1 to include in claim 10. Not being able to ascertain the amount of subject matter of claim 1 to incorporate into claim 10 renders claim 10 indefinite.

8. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

9. Claims 10 and 11 are rejected under 35 U.S.C. 102(b) as being anticipated by Hirai et al. Japan 8-100228. Japan/228 discloses a valve spring as shown in figure 1 which is positioned against a seat 24 of retainer 20. In regard to claim 11, Japan

discloses a valve 16 in figure 1 which is capable of use with the claimed retainer assembly.

10. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

11. Claims 1, 2, 4-6, 12-15, 18 and 19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Japan 8-100228 in view of Hirai et al. and Tank et al. Japan/228 discloses a titanium alloy valve retainer 20 with a wear resistant coating 28, and a shim coating 26 substantially as claimed but does not disclose using tungsten carbide in the coating. However, Hirai and Tank teach other valve spring retainers made from titanium alloy (see col. 1, lines 16-24, in Hirai; and col. 1, lines 14-22, and col. 4, lines 10-25 of Tank) having a tungsten carbide coating (see col. 34, lines 31-34, and claim 6 in Hirai; and col. 3, lines 8-13, of Tank) for the purpose of increasing the wear resistance of the coating. Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to provide the coating of Japan/228 with tungsten carbide as, for example, taught by Hirai and Tank in order to increase the wear resistance of the coating.

12. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Quets teaches the advantages of using a tungsten carbide coating for mechanical wear parts. Japan 10-317926, and Hara et al. Tech other coated valve spring retainers.

Art Unit: 3751

13. Claims 3, 7-9, 16 and 17 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

14. Claims 27-31 are allowed.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to J. Casimer Jacyna whose telephone number is 571-272-4889. The examiner can normally be reached on Wed. thru Fri. 9AM-7PM, Mon. 7AM-1PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Justine Yu can be reached on 703-272-4835. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



J. Casimer Jacyna
Primary Examiner
Art Unit 3751

JCJ